I. AMENDMENTS

IN THE CLAIMS

Please enter new claims 22-25, as shown below.

1. (Previously presented) A recombinant Modified Vaccinia Vaccine Ankara (MVA) virus comprising at least one nucleic acid coding for a *Plasmodium falciparum* merozoite surface protein-1 (MSP-1) protein or a fragment or mutein thereof, wherein the fragment of MSP-1 is selected from the fragments p83, p30, p38, p33, p19, and p42, or a combination thereof, wherein the mutein comprises an amino acid sequence that differs from the MSP-1 amino acid sequence by addition, deletion, insertion, inversion, and/or substitution of one or more amino acids, and wherein the nucleic acid coding for MSP-1 is reduced in its adenine and thymine (AT) content compared to the wild type sequence.

2. (Previously presented) The recombinant MVA virus according to Claim 1, wherein the MSP-1 protein is the MSP-1 protein of the isolate 3D7 or the MSP-1 protein of the FCB1 strain.

3.-5. (Cancelled)

6. (Previously presented) The recombinant MVA virus according to Claim 1, wherein the nucleic acid coding for MSP-1 is under the control of a promoter.

7. (Previously presented) The recombinant MVA virus according to Claim 1, wherein the nucleic acid at the 5' end is fused with a nucleotide sequence coding for a signal peptide sequence.

8. (Previously presented) The recombinant MVA virus according to Claim 7, wherein the signal peptide sequence controls the secretion of the gene product.

9. (Previously presented) The recombinant MVA virus according to Claim 7, wherein the signal peptide sequence controls the localisation of the gene product to the membrane.

10. (Previously presented) The recombinant MVA virus according to Claim 7, wherein the signal sequence controls the glycosylphosphatidylinositol anchoring of the gene product.

11. (Previously presented) A method of production of a recombinant Modified Vaccinia Vaccine Ankara (MVA)-based virus, wherein the method comprises the steps:

a) transfecting a eukaryotic host cell with a transfer vector, wherein

i) the transfer vector comprises a nucleic acid encoding a *Plasmodium falciparum* merozoite surface protein-1 (MSP-1) protein, or a fragment or a mutein thereof, wherein the fragment of MSP-1 is selected from the fragments p83, p30, p38, p19, and p42, or a combination thereof, wherein the mutein differs by the addition, deletion, insertion, inversion and / or substitution of one or more amino acids from the MSP-1 sequence, and wherein the nucleic acid coding for MSP-1 is reduced in its adenine and thymine (AT) content compared to the wild type sequence;

ii) the nucleic acid according to i) is flanked by MVA sequences 5' and / or 3', wherein the sequences are suitable for the homologous recombination in the host cell;

b) infecting the cell from step (a) with a virus based on MVA;

c) cultivating the host cell under conditions suitable for homologous recombination; and

d) isolating the recombinant MVA-based virus.

12. (Previously presented) The method according to Claim 11, wherein the recombinant virus is isolated from the culture supernatant or from the cultivated host cells.

13. (Previously presented) A vaccine comprising:

a) the recombinant virus according to one of Claims 1, 2, and 6-9; and

b) a pharmacologically compatible carrier.

14. (Previously presented) The vaccine according to Claim 13, further comprising: c) MSP-1, a fragment or a mutein thereof and / or a nucleic acid coding for MSP-1, or a fragment or mutein thereof.

15. (Previously presented) The vaccine according to Claim 14, wherein the constituents a) and c) can be administered simultaneously, sequentially or separately.

16. (Previously presented) A method for the prophylaxis and / or therapy of malaria, the method comprising administering the recombinant virus of any one of Claims 1, 2, and 6-9.

17. (Previously presented) A method for the prophylaxis and / or therapy of malaria, the method

comprising administering: i) a recombinant virus according to one of claims 1, 2, and 6-8; and ii) MSP-1, a fragment or a mutein thereof and / or a nucleic acid coding for MSP-1, or a fragment or mutein thereof, wherein the fragment of MSP-1 is selected from the fragments p83, p30, p38, p33, p19, and p42, or a combination thereof, and wherein the mutein comprises an amino acid sequence that differs from the MSP-1 amino acid sequence by addition, deletion, insertion, inversion, and/or substitution of one or more amino acids.

18. (Previously presented) The method of claim 11, wherein the transfer vector comprises a selection marker.

19. (Previously presented) The method of claim 11, wherein the MVA-based virus is MVA.

20. (Previously presented) The vaccine of claim 13, wherein the vaccine does not comprise an adjuvant.

21. (Previously presented) The vaccine of claim 13, further comprising a recombinant MSP-1 protein.

22. (New) A vaccine composition comprising:

a) a recombinant Modified Vaccinia Vaccine Ankara (MVA) virus comprising at least one nucleic acid coding for a *Plasmodium falciparum* merozoite surface protein-1 (MSP-1) protein, or a fragment or mutein thereof; and

b) a pharmacologically compatible carrier, wherein the vaccine does not comprise an adjuvant.

23. (New) The vaccine composition of claim 22, wherein the fragment of MSP-1 is selected from fragments p83, p30, p38, p33, p19, and p42, or a combination thereof.

24. (New) The vaccine composition of claim 22, wherein the mutein comprises an amino acid sequence that differs from the MSP-1 amino acid sequence by addition, deletion, insertion, inversion, and/or substitution of one or more amino acids.

25. (New) The vaccine composition of claim 22, wherein the nucleic acid encoding MSP-1 or a fragment or mutein thereof is reduced in its adenine and thymine (AT) content compared to the wild-type sequence.